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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/775,203

02/11/2004

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02/24/2006

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EXAMINER

NGUYEN, CHAU N

ART UNIT

PAPER NUMBER

2831

DATE MAILED: 02/24/2006

Please find below and/or attached an Office communication concerning this application or proceeding.



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**BEFORE THE BOARD OF PATENT APPEALS
AND INTERFERENCES**

Application Number: 10/775,203
Filing Date: February 11, 2004
Appellant(s): KUWAYAMA ET AL.

MAILED

FEB 24 2006

GROUP 2800

Brian W. Hannon
For Appellant

EXAMINER'S ANSWER

This is in response to the appeal brief filed Dec. 20, 2005 appealing from the Office action mailed June 8, 2005.

(1) Real Party in Interest

A statement identifying by name the real party in interest is contained in the brief.

(2) Related Appeals and Interferences

The examiner is not aware of any related appeals, interferences, or judicial proceedings which will directly affect or be directly affected by or have a bearing on the Board's decision in the pending appeal.

(3) Status of Claims

The statement of the status of claims contained in the brief is correct.

The appellant's statement of the status of amendments after final rejection contained in the brief is correct.

(5) Summary of Claimed Subject Matter

The summary of claimed subject matter contained in the brief is correct.

(6) Grounds of Rejection to be Reviewed on Appeal

The appellant's statement of the grounds of rejection to be reviewed on appeal is correct.

(7) Claims Appendix

The copy of the appealed claims contained in the Appendix to the brief is correct.

(8) Evidence Relied Upon

2001/0016459	LIVSHIZ et al.	8-2001
5,045,527	IKENO et al.	9-1991
JP07-161392	KOBAYASHI, YUTAKA	6-1995

(9) Grounds of Rejection

The following ground(s) of rejection are applicable to the appealed claims:

Claim Rejections - 35 USC § 103

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any

inventions covered therein were made absent any evidence to the contrary.

Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

3. Claims 1, 2, 5 and 6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kobayashi (JP7-161392) in view of Livshiz et al. (2001/0016459).

Kobayashi discloses a structure for waterproofing a terminal-wire connecting portion comprising a wire including a conductor portion and an insulating sheath, and a terminal including a substantially cylindrical wire connection portion (11), wherein the conductor portion and the insulating sheath are inserted in the wire connection portion, and the wire connection portion is press radially (Figures 1a and 1b) so that the conductor portion and the insulating sheath are held in intimate contact with an inner peripheral surface of the wire connection, and the diameter of the wire connection portion is uniformly reduced over an entire length of the wire connection (Fig. 1b).

Although Figure 1b of Kobayashi shows the wire connection being pressed radially, Kobayashi does not specifically disclose the wire connection portion being pressed over an entire periphery and over an entire length. Livshiz et al. discloses a structure comprising a wire connection portion (55) which is being pressed radially over an entire periphery and over an entire length ([0084] and [0085]). It would have been obvious to one skilled in the art to press the wire connection portion of Kobayashi over an entire periphery and over an entire length as taught by Livshiz et al. to ensure the connection between the wire and the connection portion.

The modified structure of Kobayashi also discloses the wire connection including a smaller-diameter insertion hole for the conductor portion and a larger-diameter insertion hole for the insulating sheath, the smaller-diameter and larger-diameter insertion holes being disposed in coaxial relation to each other (re claim 2). Claims 5 and 6 are method counterparts of claims 1 and 2.

4. Claim 9 is rejected under 35 U.S.C. 103(a) as being unpatentable over Kobayashi in view of Livshiz et al. as applied to claim 5 above, and further in view of Ikeno et al. (5,045,527).

Claim 9 additionally recites the pressing being effected by a rotary swaging machine. Ikeno et al. discloses an invention relating to pressing a cylindrical portion radially uniformly to reduce the diameter of the portion, wherein the pressing is effected by a rotary swaging machine. It would have been obvious to one skilled in the art to use rotary swaging machine to radially uniformly compress the wire connection portion of Kobayashi since rotary swaging machine is one of well-known methods to provide a smooth, diameter-reduced and uniform wire as taught by Ikeno et al.

(10) Response to Argument

Appellant argues that Figure 1b of Kobayashi shows the wire connection being pressed radially in a single dimension by hydraulic pressing, therefore Kobayashi does not show the wire connection being uniformly reduced over an entire length of the connection portion. These arguments are not found persuasive. Figure 1b of Kobayashi is a cross-sectional view of the connection (see also Figure 3 of the present invention). Kobayashi does not specifically disclose the wire connection being pressed radially in a single dimension. Appellant argues that the wire connection of Kobayashi is pressed by a hydraulic pressing, a normal (known) pressing machine which cannot uniformly compress the terminal (see appellant's

brief, page 11, lines 10-13). Appellant, however, does not provide any evidence to support for his fact that hydraulic pressing cannot uniformly compress a terminal. Examiner, in the other hand, (see U.S. Patent to Cost, 5,307,678, col. 6, lines 6-7 and 9-12) finds that hydraulic pressing can uniformly compress a tubular portion around its circumference. Based on the fact that pressure is applied radially and uniformly over the length of the wire connection portion of Kobayashi (see Figure 1b), the diameter of the wire connection portion of Kobayashi is uniformly reduced.

Regarding the Livshiz et al. reference, appellant argues that the apparatus 40 of Livshiz et al. cannot press the wire connection portion uniformly over an entire periphery and an entire length. Appellant states that the shape of the forming coil 46 is not provided at a uniform distance around the assembly 52. Instead, the coil is U-shaped with a gap 2, see Fig. 6. These arguments are not found persuasive. Firstly, there is no reference numeral 2 in Figure 6 of Livshiz et al. Secondly, the coil 46 itself is a U-shape, but the lumen 50, of which the wire connection 55 is inserted therein, is not a U-shape. It is tubular. Although shown by Livshiz et al. that the lumen 50 has a little gap, this gap will be closed by a pulsed magnetic force to compress the wire connection 55. Finally, Livshiz et al. also discloses that the width of the coil 46 determines the length of a workpiece which will be worked

when current is discharged through the coil (see Livshiz et al., [0084]).

Accordingly, Livshiz et al. does teach compressing a wire connection portion over an entire periphery and over an entire length.

In response to appellant's argument that the examiner has ignored the requirement in the claims that the reduction in diameter connection portion is uniform, according to the Office Action mailed on 1/21/2005 and the Office Action mailed on 6/8/2005, both of the Office Actions state that Kobayashi discloses the diameter of the wire connection portion is uniformly reduced, see Figures 1a & 1b. The fact that the appellant does not agree with the examiner's position, does not mean that the examiner has ignored the claimed limitations.

In response to applicant's argument that there is no suggestion to combine the references, the examiner recognizes that obviousness can only be established by combining or modifying the teachings of the prior art to produce the claimed invention where there is some teaching, suggestion, or motivation to do so found either in the references themselves or in the knowledge generally available to one of ordinary skill in the art. See *In re Fine*, 837 F.2d 1071, 5 USPQ2d 1596 (Fed. Cir. 1988) and *In re Jones*, 958 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992). In this case, the suggestion or motivation to do so is found in the references themselves. Specifically, Livshiz et al. teaches that compressing the wire

connection portion over an entire periphery and over an entire length to firmly join the wire and the connection portion to one another.

(11) Related Proceeding(s) Appendix

Evidence appendix and Related proceedings appendix are not provided with the brief. Examiner assumes that there are no evidence and no related proceedings.

For the above reasons, it is believed that the rejections should be sustained.

Respectfully submitted,



Chau N. Nguyen

Primary Examiner 2831

Conferees:

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Darren Schuberg



Chau Nguyen

